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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/713,659	11/15/2000	Daniel Geier	7.035	3551

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EXAMINER

SINGH, SUNIL

ART UNIT PAPER NUMBER

3673

DATE MAILED: 11/25/2002

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.
09/713,659

Applicant(s)
Geier et al.

Examiner
Sunil Singh

Art Unit
3673



-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on _____.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11; 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-31 is/are pending in the application.
- 4a) Of the above, claim(s) _____ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 2, 3, 9-11, and 14-23 is/are allowed.
- 6) ☒ Claim(s) 1, 5-8, 12, 13, and 24-31 is/are rejected.
- 7) ☒ Claim(s) 4 is/are objected to.
- 8) ☐ Claims _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are a) ☐ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved by the Examiner.
If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgement is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
a) ☐ All b) ☐ Some* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
 - ☐ Certified copies of the priority documents have been received in Application No. _____.
 - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

*See the attached detailed Office action for a list of the certified copies not received.

- 14) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).
a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892) 4) ☐ Interview Summary (PTO-413) Paper No(s). _____
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948) 5) ☐ Notice of Informal Patent Application (PTO-152)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s). _____ 6) ☐ Other:

Art Unit: 3673

DETAILED ACTION

Claim Rejections - 35 USC § 112

1. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

2. Claims 12-13 and 24-31 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

Claim 12 is confusing because claim 12 calls for the first free swinging eccentric weight to be sandwiched between **a first end** of the fixed eccentric weight and first bearing; however, the claim also calls for the second free eccentric weight to be sandwiched between **said first end** of the fixed eccentric weight and a second bearing or torque transfer element. This is incorrect.

Claim 24 is indefinite since one cannot determine what the means and bounds are for the claimed limitation “without the use of any mounting hardware”.

Claim 27 lines 4-6, is indefinite since one cannot determine what the means and bounds are for the claimed limitation “without using any hardware”; at lines 5-6, “without using any mounting hardware”.

Claim 31 is confusing because at line 14+, the claim calls for the rigid free swinging weight to be restrained from axial movement along the shaft by **two separate exciter components**, it is noted that the free swinging weight is restrained from axial movement by being between the fixed

Art Unit: 3673

weight and one of a bearing or torque transfer element. In this case the fixed weight is considered as **both** the fixed weight and one of the two separate exciter component.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 1, 5, 8 and 31 are rejected under 35 U.S.C. 103(a) as being unpatentable over Stanton '847 in view of Martinez (US 3892496).

Stanton discloses the invention substantially as claimed. However, Stanton lacks a rigid free swinging eccentric weight mounted on said exciter shaft so as to rotate with respect to said exciter shaft between a first angular position in which the eccentricity of said free swinging weight adds to the eccentricity of said fixed weight and a second angular position in which the eccentricity of said free swinging weight detracts from the eccentricity of said fixed weight, wherein said free swinging weight is mounted on said exciter shaft so as to be restrained from substantial axial movement along said exciter shaft without the use of any retaining structure that is fixed to said free swinging weight. Martinez teaches a rigid free swinging eccentric weight (see Fig. 2, (3)) mounted on said exciter shaft so as to rotate with respect to said exciter shaft between a first angular position in which the eccentricity of said free swinging weight adds to the

Art Unit: 3673

eccentricity of said fixed weight and a second angular position in which the eccentricity of said free swinging weight detracts from the eccentricity of said fixed weight, wherein said free swinging weight is mounted on said exciter shaft so as to be restrained from substantial axial movement along said exciter shaft without the use of any retaining structure that is fixed to said free swinging weight. It would have been considered obvious to one of ordinary skill in the art to modify Stanton by substituting the vibrating means as taught by Martinez for the vibrating means disclosed by Stanton since it is a design choice to substitute equivalent parts for performing equivalent functions. Furthermore assembly of the vibrating means would be less complicated. Claim 31 is similarly rejected as claim 1 above with the exception that the examiner is considering Fig. 6 of the Martinez reference in this instance as the teaching of the vibrating means. The free swinging weight is considered as (12) and the two separate exciter components are considered as reference (14) and the fixed eccentric weight is considered as (11).

5. Claims 6-7 are rejected under 35 U.S.C. 103(a) as being unpatentable over Stanton in view of Martinez as applied to claim 1 above, and further in view of Century (U.S. Pat. 3561336).

Stanton (once modified) discloses the invention substantially as claimed. However, the (once modified) Stanton is silent about his motor having a rotary output shaft which is coupled to the exciter shaft and which is co-axial with the exciter shaft, the motor output shaft being splined directly to the exciter shaft. Century teaches having a motor (70) having a rotary output shaft (80) which is coupled to an exciter shaft (47) and which is co-axial with the exciter shaft, the motor output shaft being splined (81,61) directly to the exciter shaft (see Fig. 2). It would have

Art Unit: 3673

been considered obvious to one of ordinary skill in the art to further modify (the once modified) Stanton by substituting the motor/ shaft coupling means as taught by Century for the motor/shaft coupling means as disclosed by (the once modified) Stanton since it would be an obvious design choice to substitute equivalent parts for performing equivalent function. It should be noted that such an arrangement allows for ample backlash and play.

Allowable Subject Matter

6. Claim 4 objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.
7. Claims 2-3, 9-11, 14-23 allowed.
8. Claims 13, 24-26, 28-30 would be allowable if rewritten to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action and to include all of the limitations of the base claim and any intervening claims.
9. Claims 12 and 27 would be allowable if rewritten or amended to overcome the rejection(s) under 35 U.S.C. 112, second paragraph, set forth in this Office action.
10. As allowable subject matter has been indicated, applicant's reply must either comply with all formal requirements or specifically traverse each requirement not complied with. See 37 CFR 1.111(b) and MPEP § 707.07(a).

Art Unit: 3673

Response to Arguments

11. Applicant's arguments with respect to claim 1 and its corresponding dependent claims have been considered but are moot in view of the new ground(s) of rejection.

Conclusion

12. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).


A shortened statutory period for reply to this final action is set to expire **THREE MONTHS** from the mailing date of this action. In the event a first reply is filed within **TWO MONTHS** of the mailing date of this final action and the advisory action is not mailed until after the end of the **THREE-MONTH** shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than **SIX MONTHS** from the date of this final action.

13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Sunil Singh whose telephone number is 308-4024. The examiner can normally be reached on Monday through Friday from 8:30 AM to 5:00 PM.

Art Unit: 3673

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, David Bagnell, can be reached on (703) 308-2151. The fax phone number for the organization where this application or proceeding is assigned is 305-7687.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 308-2168.


DAVID BAGNELL
SUPERVISORY PATENT EXAMINER
TECHNOLOGY CENTER 3600

Sunil Singh

Patent Examiner

Art Unit 3673

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11/21/02